

G.L. Hager - Short Biography

Dr. Hager received his Ph.D. in genetics at the University of Washington in the lab of Ben Hall. He pursued postdoctoral studies with Dick Epstein at the Institut de Biologie Moleculaire in Geneva and with Dr. William Rutter at the University of California-San Francisco. He carried out the first molecular cloning of retroviruses at the NIH [1] and described the first identification of steroid responsive regulatory elements [2]. He also was first to introduce the concept of chromatin modification as an important component of nuclear receptor action [3,4]. In 2000, Dr. Hager reported the first observation of transcription factor binding to specific regulatory elements in living cells, and discovered the phenomenon of rapid exchange of regulatory proteins with binding sites in the genome [5]. He recently found that this dynamic mechanism of receptor/genome interaction is critically involved in the physiological action of nuclear receptors [6]. He has also pioneered the genome-wide characterization of chromatin transitions [7,8]. He is currently Chief of the Laboratory of Receptor Biology and Gene Expression, and Chair of the Center of Excellence in Chromosome Biology at the NCI. His program interests include the role of chromatin structure in gene regulation, mechanisms of nuclear receptor action, genome-wide organization of regulatory elements, and the architecture of active genes in the interphase nucleus.

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